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Snowy Owl Brings New Record of Chewing Louse to Virginia

James F. Whatton

Feather Identification Lab
Department of Vertebrate Zoology, MRC 116
National Museum of Natural History
Smithsonian Institution
P.O. Box 37012
Washington, DC 20013

Ralph P. Eckerlin

Natural Sciences Division
Northern Virginia Community College
Annandale, Virginia 22003

The Snowy Owl (*Bubo scandiacus*) is a resident of the Arctic tundra with a circumpolar distribution. For reasons not entirely known, but believed to be related to unusually high breeding success in the summer and scarcity of food (primarily lemmings and voles) the following winter, particularly young owls disperse far south in search of food (Holt et al., 2016). In the winter of 2013-2014 there was an unusually large incursion of Snowy Owls into the temperate zone of North America. Virginia was near the southern end of this mass irruption and there were numerous sight records of the large white owls from Virginia. Snowy Owls were sighted in Dutch Gap, Chesterfield Co., Bridgewater, Dayton, and Mt. Crawford, Rockingham Co., Yorktown Battlefield, York Co., Kiptopeke State Park, Hog Island, Fisherman's Island, and Cape Charles, Northampton Co., Chincoteague and Queen Sound, Accomack Co., Reagan National Airport, Arlington Co., Glen Allen, Henrico Co., the Rappahannock River Valley National Wildlife Refuge, Richmond Co., and the cities of Hampton, Richmond, and Virginia Beach (Virginia Birds, 2014). Other records were from the Springfield Mall, Fairfax Co., Dulles International Airport, Loudon Co., and Manassas Regional Airport, Prince William Co. (eBird, 2016). It is likely that there were numerous sightings that were not recorded and some of the above sightings may have been of the same bird.

In addition to sight records, two of the Snowy Owls present at Reagan National Airport were struck by airplanes and died. One owl (FAA, 2016) was sent to the Feather Identification Lab at the National Museum



Fig. 1. Male *Strigiphilus ceblebrachys*, USNMMENT 01193985.

of Natural History and prepared as a study skin (USNM 652721). While preparing the study skin of this female bird killed on 3 February 2014, one of us (JW) noted and preserved several ectoparasites. The ectoparasite sample saved was a portion of a larger population and consisted of 5♂, 3♀ adults, and 2 nymphs. The parasites were identified as the chewing louse, *Strigiphilus ceblebrachys* (Denny, 1842) (Fig. 1), which is a member of the Order Phthiraptera, Suborder Ischnocera, and Family Philopteridae, and is a new record for Virginia. Specimens were preserved in 95% ethanol, partially cleared in a dilute KOH solution overnight, dehydrated in an ethanol series, cleared in xylene and mounted on slides in Canada balsam. The lice were identified using the keys and figures in Price et al. (2003) and Clayton & Price (1984). Specimens have been deposited in the Entomology collections of the National Museum of Natural History, USNMMENT 01193750, 01193777, 01193825, 01193826, 01193855, 01193892, 01193985.

Strigiphilus ceblebrachys is apparently a host specific parasite of the Snowy Owl and has not been documented with certainty to parasitize any other host species (Clayton, 1990). There are published records of *S. ceblebrachys* in the United States from Maine, New Hampshire, Washington, North Dakota, Minnesota, Wisconsin, Indiana, and New York (Peters, 1932; Clayton & Price, 1984). Virginia appears to be the southern-most known locality for *Strigiphilus ceblebrachys* in the United States.

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